IN THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application:

1-31. (Canceled)

32. (New) A perpendicular recording write head, comprising:

a first ferromagnetic pole layer having opposite proximal and distal ends, the proximal end terminating at an air-bearing surface;

a back gap layer formed on the first ferromagnetic pole layer at the distal end;

a second ferromagnetic pole layer having a first end recessed from the air-bearing surface and a second end coupled to the back gap layer;

a coil structure formed between the first and second ferromagnetic pole layers, the coil structure being encapsulated by a non-magnetic material;

a third ferromagnetic pole layer formed on the second ferromagnetic layer having a tapered tip proximate a pole tip region, the tapered tip recessed from the air-bearing surface;

a laminated write pole tip layer formed coplanar to and adjacent the third ferromagnetic pole layer for providing a flux path from the third ferromagnetic pole layer to the air-bearing surface;

a non-magnetic material configured to completely encircle and encapsulate the laminated write pole tip layer on four sides, the non-magnetic material being formed between the laminated write pole tip layer and the first ferromagnetic pole layer, on a first and second side of the laminated write pole tip layer and on a top side of the laminated write pole tip layer;

a ferromagnetic write shield layer formed over the non-magnetic material disposed on the top side of the laminated write pole tip layer, the ferromagnetic write shield layer being physically isolated from the laminated write pole tip layer and the third write pole layer; and

a first and a second ferromagnetic stud formed at the sides of the laminated write pole tip layer, the first and a second ferromagnetic stud further connecting the first pole piece and the write shield layer for providing in-line and side magnetic shields.

33. (New) The perpendicular recording write head of claim 32, wherein the laminated write pole tip layer further comprises a trapezoidal shape to prevent adjacent track writing when skew is experienced while flying over the disk.

34. (New) The perpendicular recording write head of claim 32, wherein the laminated write pole includes a tapered portion.

35. (New) The perpendicular recording write head of claim 32, wherein the non-magnetic material is selected from a group of materials comprising TaO_x, SiO_2, Si_3N_4, Ta, W, Al_2O_3.

36. (New) The perpendicular recording write head of claim 32, wherein the write shield layer further comprising a trailing write shield layer.

37. (New) A magnetic head assembly that has a head surface, a read head and a perpendicular recording write head, comprising:

the read head including:

ferromagnetic first and second shield layers; and

a read sensor located between the first and second shield layers; and

the perpendicular recording write head including:

a first ferromagnetic pole layer having opposite proximal and distal ends, the proximal end terminating at an air-bearing surface;

a back gap layer formed on the first ferromagnetic pole layer at the distal end;

a second ferromagnetic pole layer having a first end recessed from the air-bearing surface and a second end coupled to the back gap layer;

a coil structure formed between the first and second ferromagnetic pole layers, the coil structure being encapsulated by a non-magnetic material;

a third ferromagnetic pole layer formed on the second ferromagnetic layer having a tapered tip proximate a pole tip region, the tapered tip recessed from the air-bearing surface;

a laminated write pole tip layer formed coplanar to and adjacent the third ferromagnetic pole layer for providing a flux path from the third ferromagnetic pole layer to the air-bearing surface;

a non-magnetic material configured to completely encircle and encapsulate the laminated write pole tip layer on four sides, the non-magnetic material being formed between the laminated write pole tip layer and the first ferromagnetic pole layer, on a first

and second side of the laminated write pole tip layer and on a top side of the laminated write pole tip layer;

a ferromagnetic write shield layer formed over the non-magnetic material disposed on the top side of the laminated write pole tip layer, the ferromagnetic write shield layer being physically isolated from the laminated write pole tip layer and the third write pole layer; and

a first and a second ferromagnetic stud formed at the sides of the laminated write pole tip layer, the first and a second ferromagnetic stud further connecting the first pole piece and the write shield layer for providing in-line and side magnetic shields.

38. (New) The magnetic head assembly of claim 37, wherein the laminated write pole tip layer further comprises a trapezoidal shape to prevent adjacent track writing when skew is experienced while flying over the disk.

39. (New) The magnetic head assembly of claim 37, wherein the laminated write pole includes a tapered portion.

40. (New) The magnetic head assembly of claim 37, wherein the non-magnetic material is selected from a group of materials comprising TaO_x, SiO_2, Si_3N_4, Ta, W, Al_2O_3.

41. (New) The magnetic head assembly of claim 37, wherein the write shield layer further comprising a trailing write shield layer.